

Model Based Statistics in Biology

Chapter 1. Model Based Statistics in the Sciences

Chapter 1.1 The Role of Statistics in Science
Chapter 1.2 Model Based Statistics in Biology

Verbal Models (Guess the Process) Lab 1

Chapter 1.3 Quantitative Reasoning
Two Examples
Advantages of the Model-Based Approach

First Day
Roster: Names+Email
Handout Syllabus
Questionnaire
Yellow chalk
Lab 1
Bring Cards
Location: cf syllabus

Chapter 1.1 The Role of Statistics in Science
The Dark Side of Statistics
Statistics are Balderdash - Get rid of them!
Statistics are like taxes - Inevitable.
Hypothesis testing is statistical flotsam
Model Based Statistics
Discarding the flotsam and jetsam
Learning model-based statistics

Slide presentation on website

Chapter 1.2: Model Based Statistics in Biology
Perplexing questions
Uncertainty
Verbal, Graphical, and Formal Models
Role of models in statistics
Course Structure
Opinions

on chalk board

Chapter 1.3 Quantitative Reasoning
Two Examples
Reasons for Model-Based Approach

on chalk board